JAMES

IN THE UNITED STATES DISTRICT COURT

FOR THE DISTRICT OF DELAWARE

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IN RE: ADAMS GOLF, INC. :

SECURITIES LITIGATION :

X

ORAL DEPOSITION

OF

CHRISTOPHER M. JAMES

Friday, August 11, 2006

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Oral deposition of CHRISTOPHER M. JAMES, held at the offices of AKIN GUMP STRAUSS HAUER & FELD, LLP, 590 Madison Avenue, New York, New York, commencing at 8:30 a.m., reported by Pamela Harrison, RMR, CRR, CSR and Notary Public.

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Q. Okay.
A. -- Page 3.
Q. Okay. Please.
A. So the paper entitled "A VARMA," V-A-R-M-A, "Analysis of the Causal Relations Among Stock Returns, Real Activity (sic) and Nominal Interest Rates."
My recollection is that that is an analysis because the data I believe are available, the real output and interest rate information is available, on a monthly basis that uses a monthly frequency. That would be an example.
Q. Good.
Any other examples?
A. As I sit here, I don't recall one off the top of my head; although, I would again say that the frequency with which the data are available will determine the sort of frequency with which the analysis is done typically.
Q. Doctor, I understand that's the position you take. What I'm asking is whether there is any other support beyond this article



you just pointed to.
A. There's other support in the references in that article we've provided, there's more support.
Q. 1985 article. Any support since 1985? Unless that's a typo. I thought I was reading that it was a 1985 article. Maybe that's a typo.
A. No, it is a 1985 article.
Q. So if I'm understanding you correctly, one could read the article, which I haven't, but I will, and find support for using this -- support for the convention you described.
Is there any other place that one might go to find support for using that convention?
A. Certainly. You could -- I would -- to provide you additional support would be to look at recent literature on the relationship between, say, economic activity and stock returns or relationship between interest rates and stock returns; the relationship between market share information and stock



returns or other variables of interest. And again, what you would find is, if the frequency of the data is available on a monthly basis for, say, the independent variable, then that would be the frequency with which -- the minimum frequency with which you could undertake the analysis.
Q. Sure.
Now, this recent literature you refer to, who wrote it?
A. Oh, the contributors would be -- certainly Eugene Fama has done some recent work in this area.
Q. Spell it, please.
A. Fama, F-A-M-A.
Others would be Eric Maskin, Maskin, M-A-S-K-I-N. Those are the two names that come to mind.
Q. That's very helpful.
What did they write with respect to this purported convention?
A. Well, I'm referring to their work on the relationship between, say, macroeconomic activity and various variables of



interest. I know Eric has published in the Journal of Monetary Economics, the American Economic Review.
Fama has published in the Journal of Finance, Journal of Financial Economics, The Review of Financial Studies.
Q. I believe you said this is macroeconomic activity and various variables of interest, if I heard you correctly.
A. That is what I indicated. And again, it's a very simple and intuitive concept that the frequency with which data becomes available will determine the minimum frequency with which you can undertake the analysis.
Q. And I appreciate you telling me that before, but you were very clear.
A. Good.
Q. So even I have got that one down.
So my question, however, is the work that Fama and Maskin have done, that you just referred to, which was recent work; eh?
A. Yes, I think their work is within certainly the last five or ten years.

expected relationship between market share data and the value of the company as identified in, say, analyst reports.

Second, I followed the convention which is reflected in some of the work that I've done and in, as I sit here today, the work of several authors that I recall, which is that the frequency of data availability, the minimum frequency of data availability, determines the interval on which you estimate a relationship.

I would add in addition to that, in reviewing, say, the conference call information that was a part of the Adams Golf's discussion with analysts and market participants, I recall questions regarding market share data, and I recall, I believe it was Barney Adams indicating that the contemporaneous market share data were not available as of the end of the month.

So as I sit here those are the items that I recall that are in support of the frequency and the lag structure that under -- that is associated with the regression



analyses in Exhibit-4.

Q. Anything else, as you sit here?

A. As I sit here, that's what I recall.

Q. Now, in that answer you referred to, quote, some of the work I've done, closed quote. That meant, I presume, solely the VARMA article from December '85 that you pointed to in Exhibit-1 of your report, or did it include something else?

A. It could certainly include other of my works. I would have to go through and determine the frequency of the data that I utilized. For some of the papers I simply don't recall whether the frequency was quarterly, monthly, or weekly.

Q. Sure.

Now, with regard to that VARMA article, was that a situation in which you used the convention or in which you provided cogent reasons as to why the convention was appropriate to use, or both?

A. I would have to go back and review the article. It's certainly my



recollection that the -- I followed the convention of using -- analyzing the data at the frequency with which it became available.

MR. COLLINS: Would you be kind enough to read my question back, because I'm sure you meant to, but I don't think you answered my question. Please.

(The court reporter read the record as follows:

"QUESTION: Now, with regard to that VARMA article, was that a situation in which you used the convention or in which you provided cogent reasons as to why the convention was appropriate to use, or both?")

THE WITNESS: Can I have my answer back?

MR. COLLINS: Of course.

(The court reporter read the record as follows:

"ANSWER: I would have to go back and review the article. It's certainly my recollection that the -- I followed



the convention of using -- analyzing the data at the frequency with which it became available.")

BY MR. COLLINS:

Q. So did you use it or defend it, or both?

A. I don't think I can answer your question any better than I did before. As I recall the article, I certainly used -- I followed the convention of using the data at a frequency with which it became available, and I simply don't recall whether the article also contains the defense for the use of that frequency; in other words, saying, for example, that we focus on a monthly analysis because of the -- the data is available on a monthly basis.

Q. I appreciate that answer.

What was the information that you addressed in the VARMA article that was available on a monthly basis that you used?

A. I would have to go back and look. I know that, as I recall, there is information on -- we were looking at the relationship between real activity inflation and

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stock returns. I believe at that point in time inflation data, data on the Consumer Price Index, and GDP deflator are available on a monthly basis.

Q. On a particular day each month? Please.

A. I believe the inflation data is available on a monthly basis.

Q. And the inflation data you dealt with in 1985, was that available on a particular date each month?

A. Back then, I don't recall.

Q. Okay. In your article, did you address the inflation data or some other data that was not available on a specific day each month but instead was available sometime during, say, an eight-day span each month?

A. I'm not sure I understand your question. If you are asking me is the motivation for using monthly data because there was uncertainty regarding the date at which the data were available, that was not the motivation. The motivation was the frequency of the reporting data.

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Q. I see.

What was the motivation here for using monthly data as in Models 1 and 2 on Exhibit 12?

A. Again, the one motivation was that that was the frequency with which the data were available.

Another motivation would be, consistent with the analysis that was done in Exhibit 10, that if one is focusing on, say, the relationship between stock returns and market returns or stock returns and industry returns, there is a recognition, and I think you can find that recognition would be -- the source that comes to mind would be Ibbitson & Associates which provides information on betas, Barra would be another source of information on betas, that monthly analyses are useful in identifying more structural relationships. And the reason for that is that the monthly data is an aggregate of, say, daily information which contains -- can contain what an econometrician would call noise, which is referring to random

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variations, which tend to be offsetting over a month, so that the analysis, when looking at the structural relationship, would focus on less high frequency data, say monthly, to have that randomness or noise filtered out. So, for example, you get better estimates of -- better being greater explanatory power of estimates of beta if you want to understand the firm's risk characteristics using monthly as opposed to daily data.

Q. I see. Well, this is helpful.

So applied to golf club sales, for example, do I understand that that principle you just described means that if we want to know how Orlimar market share is progressing, going up or going down, in June of 1998, it's more meaningful to look at that on a monthly basis than to look at its market share day by day during the month of June?

A. It would depend on the nature of the analysis that -- or the purpose of your analysis. Let me give you an example, perhaps, to clarify.

If I were going to investigate

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materiality, say, of whether -- the fed interest rate policy, I would -- one part of that analysis would be to look at the day in which the fed announces that it is going to either leave interest rates the same, increase them, or decrease them, and I could assess with that daily information the materiality of that decision to move interest rates.

If I were to ask a different question, say, what is the relationship between stock returns and, say, interest rate movements and other aggregate economic variables, then I might -- and I have, as indicated in that paper (indicating) -- use a monthly frequency, and the reasons for using monthly frequency is that I'm asking a different question. Rather than ask the question of what the materiality or impact of the fed policy is on a particular day, I ask what's the general relationship that I have a hypothesis concerning, such as interest rates and stock returns are inversely related. Then I would -- it's my opinion it would be more appropriate to utilize a less frequent data

Q. Adams declined some, and the S&P small cap and Callaway declined more -- is that right so far? -- on or about July 23rd.

A. If you said Callaway and the peer group?

Q. Yes.

A. I think you may have said --

Q. You know what, let me start again. You are quite right.

Am I reading this correctly that on July 23rd both Callaway and the peer group went down sharply and roughly in tandem?

A. Yes. I think if you go to the next exhibit, it might be easier.

Q. Okay.

A. 340.

Q. Okay.

A. Which has the dates and the price decline. So on 7/23/1998, Adams is down 13 percent -- about roughly 13 percent; Callaway is down 33 percent; and Miller's peer group is down 28.2 percent.

Q. I see.

Now, Miller's peer group, do



you know whether it included Callaway?

A. It did.

Q. And was the peer group -- the peer group was comprised of how many companies?

A. I believe it was -- it consisted of Callaway, Teardrop, Aldila --

THE COURT REPORTER: Callaway, comma Teardrop?

THE WITNESS: It might help, it's on the top line on the first page of Mr. Miller's report.

BY MR. COLLINS:

Q. Okay.

A. I can read these off, but it may be helpful for the court reporter just to look at them.

It would be Callaway, Teardrop, Aldila, Coastcast, Arnold Palmer, and Golden Bear.

Q. Now, as you used the peer group on Exhibits 339 and 340, was it a weighted group or was it unweighted, based on the size or the market caps or some other characteristics of the companies making up the peer group?



A. I used the peer group return as reported by Mr. Miller in his rebuttal report.

My recollection is I could come close but not exactly match the peer returns by taking the -- the peer group return by taking a value weighted average of the individuals within the group.

Q. What do you mean by "value weighted average"?

A. I was responding to the question you just asked, was it a value weighted average or an equally weighted average of the returns.

I can come close to, if I use value weights, come close to the returns that he had.

Q. That's fine. And I'm just asking you what you did in using the value weights, what process did you go through and what specifically, specifically what value did you weight.

A. The market value of the common stock.

THE WITNESS: And I apologize, but I need to take a short break.



MR. COLLINS: Off the record.

(A recess was had from 11:23 a.m. to 11:33 a.m.; and then the proceedings continued as follows:)

BY MR. COLLINS:

Q. Exhibit 339.

A. Okay.

Q. Why did you do this just for the month of July?

A. Because Mr. Miller indicated in his rebuttal report that it is his conjecture that the price decline, particularly in the latter part of July, was attributable to, I think he refers to it as leakage regarding gray market activities.

Q. Is there something about Exhibit 339 or Exhibit 340 that leads you to question that conclusion on his part?

A. I think that -- yes, I think that this analysis demonstrates, using his data, that the decline in Adams Golf during this period of time was certainly in line with the decline experienced by its -- the firms identified by Mr. Miller as being peers to Adams

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Golf, and that consistent with the discussion in my report, the decline appears to be a result principally of softness in the golf industry as reflected by the earnings miss and discussion of difficulties in the market that Callaway disclosed, and then the peer group -- I think Coastcast has a news article during that same period of time indicating same weakness in product demand, which I think is consistent with the announcement of Callaway, since Coastcast is a major supplier to Callaway.

Q. Did you undertake -- the analysis of these various stock prices, did you do any work taking it out beyond July 31st?

A. No. I -- you mean --

Q. Did you run the chart beyond July 31st?

A. No, I just focused on the dates in -- the dates that he identified as being associated with price declines in late July that he contends may be associated with information disclosures regarding -- or leakage of information regarding, say, purchase orders by Costco.

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Q. And in that regard you are referring to the information he has -- perhaps other places as well, but you are referring to the information he has in Paragraph 22(A) of his rebuttal report?

A. 22(A), yes.

Q. Now, how long ago did you prepare exhibits or did you create the documents that are now 339 and 340?

A. Within the last week.

Q. Did counsel ask you to do so?

A. No.

Q. Did you tell counsel you were doing this?

A. Yes.

Q. Did you run any other charts beyond 339 either within the last week or since the rebuttal report?

A. I don't believe so. I don't recall doing any.

Q. And did you undertake an analysis of peer performance with respect to August or September?

A. No, my focus was only on late --

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late July, is the period that he focuses in on his report.

Just to add that he -- and the other reason is that he has a chart, I believe it's -- if you don't mind, I'll take it off.

(The witness takes the clip off the document.)

BY MR. COLLINS:

Q. Please.

A. That is a -- that has a somewhat different pegging in the sense that it's pegged to 1. It's his Exhibit A. It's entitled ADGO versus XLC(4), Adams Golf versus Comparable Index. He carries it out to -- 12/23/1999 is the last date.

Q. You are referring to the page immediately after the page that says Exhibit A, or are you referring to a later?

Which chart are you referring to, please?

A. I know this is -- it doesn't make the record look particularly good because I'm holding something up, but it is this chart (indicating), and I believe you are looking at

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it.

MS. FOX: Let me just check that. I'll come around and see whether it's the same.

THE WITNESS: Just so you are clear, there appears to be two charts in his Exhibit A. One is -- it looks like they are the same chart. One is simply, in my version, a smaller version of the other.

BY MR. COLLINS:

Q. Okay. Well, the chart --

A. This you can identify --

Q. Not a problem.

A. Okay.

Q. Do you see the page that says on it Exhibit A? It's probably in your left hand.

A. Yeah, the problem I'm having is that there are a number of pages that say Exhibit A on it. Okay? Maybe we can make this easier.

This is Exhibit A (indicating), it only has Exhibit A on it. Then there is a page that follows it which is a --

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think are in Exhibit 4, I believe I did the same thing with respect to -- I simply -- my recollection -- here's what I can recall.

I did one-factor and two-factor models to see if the explanatory power was any different or the R-squareds were any different, that's what I recall. And I recall concluding based on that analysis that there weren't any difference, that my results would not change if I substituted the S&P index for the NASDAQ, for example.

Q. In constructing an index, one of the things a researcher does is try to find a good fit; correct?

A. That -- that depends on the purpose. I mean, typically it is not -- if you're simply looking for a good fit without any a priori reason for including a variable in a regression, then that is thought of as data mining and is not generally accepted as a scientific inquiry.

One begins with a hypothesis about what relationship should be expected and then empirically tests that relationship and

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set up the experiment in a way that can be replicated by a third party utilizing the techniques that you have described.

Q. Okay. Why did you use NASDAQ?

A. Well, because Adams was trading on the OTC or NASDAQ.

Q. Any other reason?

A. It's my practice if you want to look at general market movements, the index you use where you would expect to see a relationship would be companies that are trading on a similar exchange.

Q. And it's true that the NASDAQ, as Mr. Miller pointed out in his rebuttal, it's true that at the time the NASDAQ was dominated by high tech companies; correct?

A. I don't know what he means by "dominated." Certainly the NASDAQ is more heavily weighted towards growth companies at this particular point in time, which was before the '99 run-up in tech stocks. It was -- I mean, certainly the NASDAQ is more heavily weighted towards tech and growth stocks than, say, the Dow Jones Industrial Average or the

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NYCE index.

Q. In your last answer you referred to growth stocks. Did you consider Adams to be a growth stock?

A. Yes, I think it was generally considered to be a type of stock that would be considered to be a growth stock.

Q. Did you consider it to be a tech stock, a high tech stock?

A. No, I think I considered it to be a growth stock.

Q. Now, at the time you used NASDAQ, did you consider any other index besides this modified Bloomberg golf?

A. No.

Q. Did you -- you didn't consider the Dow Jones?

A. Industrial?

Q. Yes.

A. No.

Q. You didn't consider S&P 500 or S&P small cap?

A. I didn't consider S&P 500, I didn't consider the Dow Jones, I didn't consider

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the S&P small cap.

Q. Okay. Apart from NASDAQ, modified Bloomberg golf, and apart from the two of those together, did you do runs or regressions on using any other indices?

A. Other than the -- no, other than the analysis that we were just talking about a moment ago.

Q. And by that analysis you are referring to the analysis done after Mr. Miller's rebuttal report --

A. Yes.

Q. -- using the Miller peer group, or what you call that, and the S&P small cap?

A. Yes.

Q. Okay. Let's talk about event windows. What is an event window, please?

A. I'm sorry?

Q. What is an event window?

A. An event window and is commonly referred -- the most common definition of an event window is the time period over which someone undertaking an event study investigates the impact of information on stock prices or

estimation period, is it true that the lower the stock price during the estimation period, the lower the level of statistical significance?

A. Not necessarily.

Q. It isn't true that the lower the stock price, the lower the level of statistical significance?

A. No, I don't see -- I don't know of anything that would -- both conceptually or any written work that would suggest that there is a relationship between the significance of the explanatory power of the market model and the level of the stock price.

Q. The lower the stock price in general, the smaller movement in the stock price for the movement to be statistically significant, correct, at least if one refers to movement in an absolute as opposed to percentage matter?

A. I'm not sure I understand. What is your question?

Q. The stock price is lower. All right?

A. Right.



Q. If the stock price is lower, in this case in connection with the estimation period, then in order for a stock price movement during a period under study to be statistically significant, isn't it true that the movement needs to be smaller in an absolute sense in order for the level of statistical significance to be reached?

A. If you're -- are you asking me whether there's any relationship between the level of the stock price and the likelihood that a particular return would be statistically significant?

Q. I am, but my question is directed to the level of the stock price during the estimation period.

A. I'm just trying to understand your question because I -- so you're asking if I estimate a market model over a period of time when the price is relatively low --

Q. Correct.

A. -- and use that to assess statistical significance during the period when the stock price is higher --



Q. Yes.

A. -- am I likely to find -- am I less likely to find statistical significance than if I used an estimation period in which the price in absolute terms were higher?

Q. Either less likely or more likely.

A. It would -- frankly, it would depend on the circumstances. I mean, I -- you may be trying to get at the notion that there's sort of a minimum tick size and then as the price of a stock goes down, given that minimum tick size, the percentage change increases, and so if you had a very low price stock and you estimated a market model and then you used it to predict abnormal returns when the stock was appreciably higher, it would depend on whether the underlying volatility had changed, but that -- I think it would depend on the circumstances, frankly.

Q. If you could go back to Exhibit 12 of your report, please.

A. Exhibit 12?

Q. Please.



A. Okay.

Q. Now, you ran these regressions, Models 1 and Model 2 --

A. Right.

Q. -- over the 18-month period that you described previously.

A. Right.

Q. Why did you choose to do that over 18 months?

A. As I discuss in the report, I wanted to analyze the relationship over a period of time that would include the class period. If I restricted my analysis only to the class period, then I would have only three observations on which to estimate it, and typically that is not enough data on which to estimate a regression with any degree of reliability.

Q. Okay. So if you had undertaken the same analysis as described -- referenced in Exhibit 12 and if you had restricted it to the class period, you believe that any results from that regression or those regressions would have been unreliable had you done that?

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A. Well, I think it's just a matter of mechanics, that with only three observations, the estimates would be less reliable than if you used a greater number of observations.

Q. All right.

A. So, I mean, it's not specific to limiting it to the class period. If you asked me if I have one variable and one or two explanatory variables and I'm trying to estimate a relationship between the dependent variable and those explanatory variables, would I have more confidence in a regression with 18 observations as opposed to three, yes, I would, and that's the motivation for using a greater number of observations.

Q. So what Exhibit 12 and your regressions reflect is the stock price over an 18-month period, but they don't reflect the stock price versus relative market share for any particular subgroup of that 18-month period; is that accurate?

A. No, I think that certainly the information over each of the subperiods is included in and considered as part of the

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estimation of that -- of this regression.

Q. But the regression is an 18-month regression and we have a three-month class period.

A. Right; so --

Q. So my question, if I may, is, what does a regression that provides information with respect to a point in time two months or nine months after the class period, what does that regression have to do with predicting or explaining stock movements during the first three months of this 18-month period?

A. It is a -- it has everything to do with that issue for the following reason. That it's establishing what analysts that followed Adams and other observers noted, which was there is a direct relationship between Adams' earning -- Adams Golf's earning stock price and its relative market share. And this is providing statistical support for that -- that observation. There is -- using data both during the class period and after the class period.

So if, for example, as I was

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attempting to do, the question is why -- what reasons can one provide for the decline in the price of Adams during the class period, and one knows that both conceptually and empirically there is a relationship between Adams Golf stock price and its market share, then I think that's relevant for purposes of explaining what moved the stock price.

Q. In your last answer, if you had substituted relative market share for numbers of clubs sold through the gray market, would that also have been a regression or a pair of regressions that could, had you chosen to run them, conceivably provided statistical support for observations made by market participants in or around the time of the class period?

A. No, for the following reason, what is motivating this analysis is an a priori expectation based on the commentary of market participants during the period that there's a direct relationship between level of stock price and market share.

And second, this is based upon information that was publicly available and a

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part of the information available to market participants.

Q. During the class period?

A. Both during the class period and after the class period. And I'm not aware -- first of all, I'm not aware of any analyst commentary, for example, linking or suggesting a link between the level of Adams' stock price and the number of clubs sold in the gray market.

Q. Okay.

A. Nor am I aware of any contemporaneous public information during the class period, or for that matter, after the class period, that provides a -- which was publicly available, it provides the proportion of sales in the gray market relative to total sales.

Q. That's fine.

What difference does it make whether it's publicly available or available through non-public means if it's after the class period; what possible bearing could that have upon the usability of the information?

A. It is usable for the purpose of

Q. Stock return.
And how do you choose what stock return you use?
A. Over the month?
Q. For each month.
A. It's from the close of the prior month to the close of the current month, so it would be the cumulative return over the month, so all of the returns in the month are used. All the daily returns are incorporated into the monthly return.
Q. And for the monthly observation for the industry index, how did you determine that?
A. The same, the same way. So you take each component of the industry -- I think the index -- the Bloomberg index is on -- you can -- I think -- I think I recall seeing it on a level basis, you just take level prior month -- level at the end of the month plus level at the prior month divided by level at the prior month will give you the return over that month, the same way you calculate a return over the month.



Q. Why did you perform the regression in Exhibit 10; what did that add to the work you were doing otherwise?
A. I think we touched on this topic this morning when we had a discussion of why market participants and researchers utilize, say, monthly returns. Remember I said if you look at Ibbitson or Barra or other vendors of what are called betas, how stock moves with the market, those vendors may also have how stock moves with industry comparables; that generally that analysis -- not always, but typically that analysis is done to figure out the influence of general industry factors, is done on a monthly basis as opposed to a daily basis for the reasons I gave you before, which is that on a monthly basis you are basically taking out a lot of noise that occurs, what a statistician would refer to as noise, on the daily returns due to randomness.
Q. So, again, with regard to Exhibit 10, if there were volatility in either the index on an intramonth basis or in Adams Golf stock on an intramonth basis, that would



not be reflected; that would be washed out by your monthly observation?
A. Yes, but it would be only looking at how one could explain monthly variations in the stock return relative to monthly variations in the industry index.
Q. Why was the period under study in Exhibit 10, why did that cut off at June 11?
A. You know, I looked at Exhibit 10 and I knew you were going to ask that question, and I don't recall. I think it, frankly, might be an oversight.
Q. "An oversight" meaning what?
A. On my part. So I need to go back -- in just assembling this, as I sit here, I don't recall why it ended in June of 1999.
Q. Did you consider -- and I understand, I respect people that forget things, I do that, too. But did you consider, if you know, running the regression at Exhibit 10 through December '99 as you ran the regressions in Exhibit 12?
A. I don't recall making a distinction between June of 1999 and December of



1999, so as I sit here I don't recall making any conscious decision to cut one analysis at 6/99 and the other analysis at year-end 1999.
Q. I want to go back to a couple of points you raised earlier. First, you said that you did consider a two-day event window in response to the August 28, 1998, Lehman analyst report; correct?
A. Right.
Q. Did you consider a three-day event window?
A. No.
Q. Did you consider a two-day event window with regard to any other periods of the class period?
A. I don't recall that I did.
I do recall, as we mentioned earlier today, doing an analysis in response to something which was in Mr. Miller's report, and that was he indicated -- he made two points: First, that, you know, while I looked at statistical significance at a 95 percent level, I didn't look at the significance at other levels. And, as I indicated in my

report, the 95 percent level is the conventional level; although, some researchers will report significance at a 10 percent level. And so I examined whether there were days that were significant at a 90 percent level and what information was coming to the market on those days.

Second is in response to a comment in his report concerning looking at the returns over multiple days. I asked the question of whether if the results and my conclusions regarding statistical significance and the information coming to the market on those days would be altered if I used a two-day window, and concluded that -- my conclusions were the same whether I used a two-day window or a one-day window for each of the events that I analyzed.

So if you take the Golf Pro August 1st article and say, well, look at a two-day window around that, would that alter your conclusion regarding the statistical significance, would using a 90 percent confidence interval as opposed to a 95 percent



confidence interval impact the conclusion, and the answer to both of those questions is no.

Q. Which events or which time periods during the class period did you consider using a multiple-day event window for?

A. Every day.

Q. Okay. And which events did you consider using the 90 percent confidence level for?

A. Every day.

Q. And how did you apply that using every day? For example, if I can turn you to Page Exhibit 5?

A. Mm-hmm.

Q. With regard to using a multiple-day event window, what did you mean by that; three days or five days?

A. Two days.

Q. Okay. You didn't look at anything more than two days, did you?

A. No, I had no information that would indicate to me that the market would not operate in an efficient way and I had no information to me that indicated any uncertainty



regarding -- there would be no reason to use a multiple-day window more than two days for this analysis because you would use that if you were uncertain as -- you have a news announcement -- we talked about this earlier today; if you had a news announcement and you weren't sure whether that news announcement was made -- you know what day it was made on, but you don't know whether it was during trading hours or not.

Q. Sure.

But you might also have new information enter in the market or allegedly new information enter in the market that might be in the form of rumor or oral communication which would be another situation in which you were uncertain as to what the disclosure date is. Correct?

A. No, I would certainly think that if there was an allegation that a rumor or oral communication were material, that you would be able to identify the date at which that information became available to the market. I would also say that -- and be able to relate it, as I talked about earlier today, in an objective



scientific manner, to the price reaction.

As I have indicated, oral communication, as it would be in the context of a conference call with investors, you would look at the day on which that conference call occurred, that oral communication, for purposes of determining whether that communication was material.

Q. If it were a rumor, however, you might not know when the rumor first started circulating; correct?

A. I think that's -- I mean, again, it's -- and we went through this before -- I would -- if I were asked to assess the materiality of an alleged rumor, the first step I would take is to try to determine when that rumor was being utilized by market participants for purposes of pricing or valuing the stock.

I would also think that -- there's certainly -- and I would -- I would expect to see, if it was a rumor that was material and significant to investors, that -- as I indicated before, that there would be some commentary on it, in some source.

circumstances in which the insider trading occurred.

Q. What would you need to know? Or what would you need to suspect?

A. I'm not -- I think I would have to do a thorough analysis of the facts and circumstances to reach a conclusion regarding the importance of insider trading in a particular case and I'm not prepared today to analyze that issue.

If I were asked, however, to address the question of whether insider trades had a material impact on the stock price, I would do the following types of things: First to determine, as I indicated before, whether those insider trades were -- trading information was available to market participants; second, to determine the timing of those trades; and, third, to assess whether those trades are associated with a statistically significant price movement.

MR. COLLINS: All right, let's go off the record.

(A recess was had from 4:27 p.m.



to 4:45 p.m.; and then the proceedings continued as follows:)

BY MR. COLLINS:

Q. When did the market become efficient? Tell me the date.

A. You mean the market for Adams Golf stock?

Q. Please.

A. I believe it was -- the evidence would suggest that it was certainly efficient -- I think it's -- I haven't actually undertaken to determine a specific date. Certainly I think it would be reasonable to conclude that the market was efficient at the time that it began trading.

Q. Was there any impact of the quiet period on that?

A. The quiet period ended I believe October -- August 4th. Certainly if I were looking at simply the Cammer factors and asking when are all of the Cammer factors met, the trading volume was almost immediately -- it was immediately. Number of market makers, it was immediately. Speed of response to new information appears to be immediate.



With respect to the analyst -- the coverage by -- and institutional ownership, that was probably the highest immediately after the IPO. During the quiet period, there would not be analyst coverage by anyone -- any analyst affiliated with an underwriter that was a part of the syndicate, so that factor wouldn't be met.

Q. It's your opinion that the October 23 price reaction which was statistically significant was not at all caused by the introduction of new information into the market with respect to gray marketing?

A. I think I answered that question, and my answer is -- I'll summarize it -- that in my opinion the price reaction on October the 22nd is a result of new information and the new information contained in the report has to do with fourth quarter earnings and that's consistent with analyst commentary and changes in their fourth quarter -- the change in the fourth quarter consensus estimate. I have not tried to parse out the extent to which. And that was a result of the softness in the



industry and softness in Adams sales as opposed to industry factors, as opposed to, as was referred to and talked about earlier, recent gray market activities.

What is clear to me is that it's not a result of the market becoming aware of the risks of the gray market activity, nor is it a result of information regarding gray market activity that was historical or contemporaneous with the initial public offering.

Q. Okay. So in your last answer you drew a distinction, if I heard you correctly, between the risk, if one existed, at the time of the IPO in connection with gray marketing, on the one hand, and, on the other hand, gray marketing's impact, if any, on those reduced analyst expectations for the fourth quarter. Those are two different things in your view.

A. I think they are distinguishable. I think what I was -- the distinction that I was drawing and I drew, when you asked me this question earlier in the day, was that there is a distinction in my mind

Q. Are there models that can be used that test materiality on the basis of volume or some combination of volume and price movement?
A. I mean, I have not seen that analysis done in the context of, say, a damage analysis. I have seen some academic studies that ask the question of whether information has an effect on trading volume.
Q. And do you have any opinion as to the usability or appropriateness of those models?
A. I think the appropriateness would depend on the purpose of their being used. I would have to go back and look at some of those papers. Most of the paper -- the academic literature in finance is more focused on how information impacts value as opposed to trading volume. Although, there are a few papers out there that look at trading volume. I just don't recall what the conclusions are.
Q. The famous Golf Pro article allegedly of August or August 1, 1998, when was that available to the market?



A. As I indicate in my report, it's my opinion that it's available to the market on August 1st.
Q. Well, surely you're not offering an opinion on that now, Dr. James, are you?
A. Yes, I am.
Q. You might be making an assumption, but you are offering -- are you an expert with regard to when Golf Pro appeared in 1998?
A. I'm not representing myself to be an expert in when Golf Pro appeared. I am representing myself to be an expert in, first of all, knowing what the publication date and the convention of using publication dates. I believe your own expert uses the publication date as the date referenced in his chronology.
Second, I undertook an investigation to determine whether there was any evidence that suggests that the Golf Pro article was available prior to the cover day and concluded based on that analysis that there was none.
Q. Okay. Do you know of any



evidence, apart from what you've put in your reports, to indicate when that Golf Pro article was available?
A. Yes.
Q. When?
A. In response to the Miller report where he conjectures that it might have been available earlier, I performed the following test. Based upon communications that I'm aware of between Cornerstone and the publishers of Golf Pro, which is now not currently published, they were unable to answer the question as to whether it was available before or after the cover price -- cover date.
So I conducted a Factiva search between 1995 and 2000 in which I used the keywords "Golf Pro magazine," and then I looked at all of the articles that were available on Factiva that reference Golf Pro magazine and asked the question of whether there was any reference in the public press to a Golf Pro magazine article prior to the stated publication date on the cover, and I was able to identify several instances in



which there is a reference to a particular issue of Golf Pro magazine, and all of the references were after the publication date which is consistent with -- which is inconsistent with the conjecture by Mr. Miller that the information was available to the market prior to the cover date.
Q. Did you save those searches?
A. No.
Q. Did you communicate with your office about providing to us information with regard to the additional regressions you said you would have?
A. I have -- it's not my office.
Q. Cornerstone. Whomever you had to communicate with.
A. Yes, and the individual that is available -- the individual who undertook that analysis is not available, he's -- that's Amir Rosen, and I believe he's attending a deposition today.
Q. Not in this case?
A. Yes, I believe he's downstairs, two stories down.